

It is Claimed:

- Sub 15
1. A recombinant nucleotide sequence encoding a mutated prolactin, wherein the expression of the sequence results in a mimic of a phosphorylated prolactin corresponding to a selected species, the mimic being capable of antagonizing growth promoting effects of non-phosphorylated prolactin in the selected species, the mimic being mutated at serine 179 or its selected species equivalent.
 2. The nucleotide sequence as in claim 1 wherein the serine mutation is by substitution.
 3. The nucleotide sequence as in claim 1 wherein the serine is mutated by an aspartate or glutamate residue substitution.
 4. The nucleotide sequence as in claim 1 wherein the serine mutation is by an aspartate residue substitution.
 5. A construct comprising the nucleotide sequence of claim 3 or 4 operatively linked with an expression vector.
 6. The construct as in claim 5 wherein the expression vector is mammalian, viral, or bacterial.
 7. A recombinant nucleotide sequence encoding a prolactin mutant, wherein the expression of the sequence results in a mimic of human phosphorylated prolactin, the mimic being capable of antagonizing a prolactin receptor, the mimic being mutated at serine 179 or its selected species equivalent.

8. The nucleotide sequence as in claim 7 wherein the mimic is mutated at serine 179 when the selected species is human, and the serine 179 is mutated by substitution with an aspartate residue.

9. A composition comprising:
a human phosphorylated prolactin mimic, the mimic in an amount effective to antagonize growth promoting effects of non-phosphorylated human prolactin, the mimic being mutated at serine 179 and being substantially free of non-phosphorylated human prolactin.

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10. The composition as in claim 9 wherein the serine 179 is substituted by an aspartate or glutamate residue.

11. The composition as in claim 9 wherein the serine 179 is substituted by an aspartate residue.

12. The composition as in claim 9 wherein the mimic is admixed with a pharmaceutically suitable carrier.

13. The composition as in claim 9 wherein the mimic is derived from the recombinant nucleotide sequence of claim 1.

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